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NOTES ON GEOGRAPHIC DISTRIBUTION

Reptilia, Colubridae, *Pseustes sulphureus*: distribution extension, new state record

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The Neotropical colubrid snake *Pseustes sulphureus* (Wagler, 1824) is widely distributed over rainforests in South America. This species occurs in the Atlantic Forest between Paraíba and São Paulo states (Peters and Orejas-Miranda 1970; Marques and Calleffo 1997), and in the Amazon Forest (see Peters and Orejas-Miranda 1970; Duellman 1978; Gasc and Rodrigues 1980; Chippaux 1986; Starace 1998; Kornacker 1999; Lehr 2001; and others). Here, we report a new record for the species, and extend its distribution to Ceará state, Northeastern Brazil.

Two individuals of *P. sulphureus* were recorded in Ceará state. A male (204.9 cm total length, TL) was collected at Sítio Olho d'Água dos Tangarás, Pacoti city, on Maciço de Baturité (04°14'09,1" S, 38°55'01,5" W, 840 m), in 8 April 2005 (Figure 1). It was deposited in the collection of the Núcleo Regional de Ofiologia of the Universidade Federal do Ceará (NUROF-UFC) with the following number: CHUFC 2326.

Another specimen, with indeterminate sex (259.1 cm TL) was found and photographed (Figure 2) on 27 March 2005 at the Parque Nacional de Ubajara, Ubajara city (03°50'25" S, 40°54'28" W, 810 m).

Figure 1. Adult of *Pseustes sulphureus* collected at Maciço Baturité, Pacoti, Ceará state, Brazil. (CHUFC 2326). Photo by J. C. L. Melo.

Figure 2. Adult of *Pseustes sulphureus* observed at the Parque Nacional de Ubajara, Ceará state, Brazil. Photo by D. Loebmann.

Both site collections are more than 600 meters above sea level. According to Andrade-Lima (1966; 1982), the vegetation covering the hillside of such plateaus can be classified as *Floresta Tropical Plúvio-Nebular Perenifólia* and *Floresta Tropical Plúvio-Nebular Sub-Perenifólia* (Figure 3), and is considered as a remaining of the Atlantic Forest. The physiognomic and climatic characteristics of this environment makes possible the establishment of a thick forest with trees up to 15-20 m high, characterized by straight stems and

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branching high above the ground, and smaller trees with many epiphytes inhabiting underground areas (Hoogmoed et al. 1994; Rodrigues and Borges 1997; Borges-Nojosa and Caramaschi 2003).

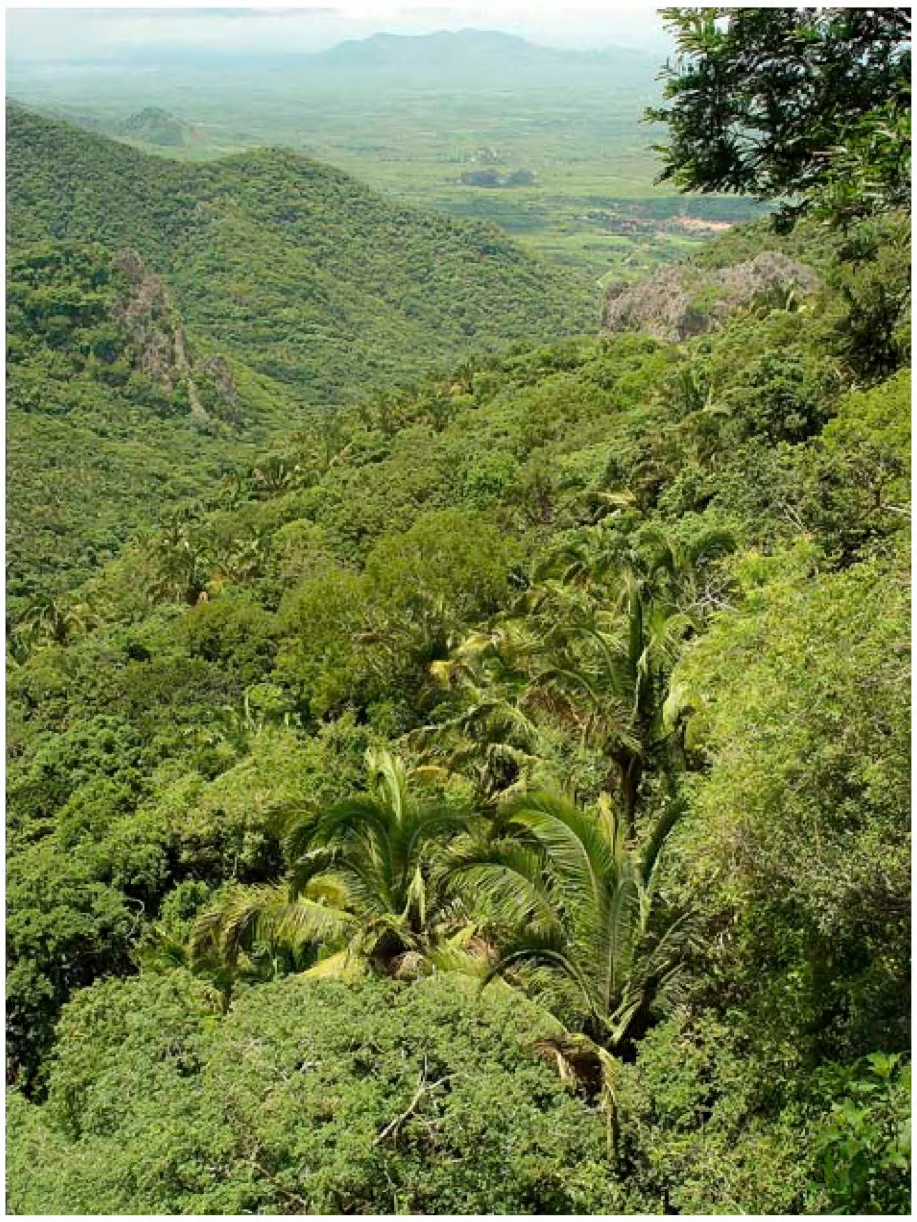

Figure 3. General view of the Floresta Tropical Plúvio-Nebular Perenifólia at the Ubajara Nacional Park, Ceará state, Brazil. Photo by D. Loebmann.

The distances between our records, Ubajara and Pacoti cities respectively, and the closest sites where the species is recorded are: 984 and 1218 km towards West, in Tucuruí city, east of Pará state (Jorge da Silva and Sites 1995), and 750 and 524 km towards Southeast, at Paraíba state (Peters and Orejas-Miranda 1970) (Figure 4).

Both sites in Ceará state, where *P. sulphureus* was recorded, are known as *Brejos de Altitude* (relictual mountain forests in the *Caatinga*). There are several reasons for such habitat to receive special attention. Those fragments are characterized by the presence of several endemic species such as: the scorpion *Broteochactas brejo* Lourenço, 1988; the snake *Atractus* sp. n. (Passos et al., unpublished data); the amphisbenian *Amphisbaena* sp. n. (Borges-Nojosa and Caramaschi unpublished data); lizards such as *Mabuya arajara* Rebouças-Spieker, 1981, *Leposoma baturitensis* Rodrigues and Borges, 1997, and *Placosoma* sp. n. (Borges-Nojosa and Caramaschi, unpublished data); and threatened anuran species such as *Adelophryne baturitensis* Hoogmoed, Borges and Cascon, 1994, and *Adelophryne maranguapensis* Hoogmoed, Borges and Cascon, 1994. The *Brejos de Altitude* of the Ceará state are the most septentrional locality of Atlantic Forest ecosystems (Borges-Nojosa and Caramaschi 2003).

Those forests can be considered as islands for many habitat-specific species, including here *P. sulphureus*. Those mountains's plateau (more than 600 m) includes the dry forest known as "Mata Seca" (*Floresta Subcaducifólia Tropical Pluvial*) that completely involves the upper part of the forest, whereas the plateau's basis (less than 100 m) is surrounded by the open formation "Caatinga Arbórea" (*Floresta Caducifólia Espinhosa*) (Figueiredo 1997). The anthropic pressure in this area, mainly by wood exploration, agriculture, and livestock activities, brings increasingly concern. Thus, this threat needs to be controlled urgently in order to conserve and preserve such oases around Northeastern *Caatinga* and, consequently, their habitat-specific species.

Figure 4. New records of *P. sulphureus* and their respective closest sites according to the literature. 1 - Paraíba state (Peters and Orejas-Miranda 1970); 2 - Pacoti city on Maciço de Baturité; 3 - Ubajara's National Park, and; 4 - Tucuruí city, east of Pará state (Jorge da Silva and Sites 1995).

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Moreover, the presence of *P. sulphureus* in the Ceará state shows strong evidence supporting the hypothesis that in the past the Atlantic and Amazon Rain Forest were able to expand and connect themselves during humid phases, extending their limits into where is currently found the semi-arid *Caatinga* (Andrade-Lima 1982; Coimbra-Filho and Câmara 1996; Borges-Nojosa and Caramaschi 2003; Cavalcante 2005). In 30 years of herpetofauna's research at Ceará those are the two first records of *P. sulphureus*. Therefore, we suggest this species should be considered threatened in the Ceará state.

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